tinued in this case it would undoubtedly have accumulated still more and probably exerted a much more toxic effect than was manifested by the skin rash. Control of the toxicity would then have been very difficult, since the kidneys were impaired and the only known effective measure is elimination by forced diuresis.

UNILATERAL FUSED KIDNEY

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In reviewing the literature on this subject, I found that it was one of the rarer of the renal anomalies. Wilmer[1] found 286 cases in the literature, 54 per cent of which had been reported since 1921. This of course is due to the increased number of post-mortems and the increased use of intravenous and retrograde pyelography. Wilmer also states that almost 20 per cent of cases are recognized between the ages of 21 and 30. Beer and Ferber[2] state that in the unilateral kidneys there is usually fusion. Carleton[3] described one case which would appear to be very similar to that here described, and attempted an explanation of the cause.

CASE

The patient was a young male school teacher, a university graduate, aged 29. He was stocky, well proportioned, and had been quite an athlete. In December, 1938, he came to me complaining of a dull ache in the left costovertebral region of 48 hours' duration. This ache became sharp if he twisted his body at the hips. In the last three hours before his visit he had had a feeling of internal pressure on the left side which made him feel faint.

On questioning, he recalled slight pains on the left side but could not recall having had any urinary symptoms at any time. The rest of the history was not significant.

During the course of an examination, which was negative in every other regard, a mass was palpated in the left lumbar region of the abdomen about one inch above the iliac crest and two inches lateral to the midline. It was firm, slightly tender, and slightly movable. The following day Dr. A. D. Irvine did an intravenous urogram. I quote his report.

"A film was made of the urinary tract and this was followed by a series of films made at intervals of five, twenty, thirty and forty-five minutes following the intravenous injection of diodrast. In the five-minute film there can be seen satisfactory filling of a non-rotated left kidney. The ureter curves well out into the left flank in its abdominal course, then curves mesially to enter the pelvis so that its pelvic course is normal. Well down below this kidney pelvis and calyces at the level of the fourth lumbar body can be seen the outline of a second kidney pelvis with small calyces pointing towards the right. This second kidney pelvis appears somewhat dilated. A ureter can be traced from this pelvis, which, crossing the midline, runs obliquely downwards in front of the sacrum and enters the bladder at the usual site of the right ureteral orifice. There is no evidence of excretion of the dye in the right abdomen. A homogeneous soft tissue density is present to the left of the spine. This represents fusion or partial fusion of both kidneys.

"Succeeding films show the same findings with an increasing amount of dye in the bladder. At twenty minutes a very satisfactory amount is present. There is no evidence of uro-lithiasis.

"The findings are those of an anomalous development of the urinary tract. A crossed dystrophy is present, all the renal tissue lying to the left of the spine. There is no evidence of uro-lithiasis. Renal excretion is normal. Very mild dilatation is present in the crossed renal pelvis."

The urine on several examinations was entirely negative. The patient was put to bed at home for two days, fluids were forced, and the urine was alkalinized. His symptoms cleared completely. One week later he returned with a complaint of a feeling of pressure in the upper part of the left iliac region. The same treatment as above for one day resulted in the disappearance of the symptoms which have not returned to date.

In reviewing the literature as to prognosis it would appear to be, definitely, not good. Most of these cases develop hydronephrosis, calculi or infection. Surgical measures are often extremely difficult, due to the fusion of kidney tissue.

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CONGENITAL ATRESIA OF THE ŒSOPHAGUS IN TWO BROTHERS

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Congenital atresia of the œsophagus occurring in two successive male births in the same family is of sufficient interest to justify this brief case report.

In September, 1938, Mrs. D. gave birth at the Stratford General Hospital to a male child weighing seven pounds. Immediately after birth it was noticed that the child had an imperforate anus. Since a previous child in this family had had a congenital atresia of the œsophagus the possibility of the same condition occurring again was suspected. Several hours after birth a small catheter was passed into the œsophagus, and about four inches from the alveolar margin it encountered an obstruction. A small amount of barium was put down the catheter and the child was examined under the fluoroscope. The œsophagus ended as a blind pouch about the level of the fourth dorsal vertebra. The stomach appeared to be distended with air. The child lived for six days and during that time coughed up considerable amounts of dark brown mucus.

At autopsy the trachea and the œsophagus showed the peculiar deformity usually associated with this condition. The upper portion of the œsophagus ended blindly at the fourth dorsal vertebra. The upper end of the lower portion of the œsophagus communicated by a small opening with the trachea, about half an inch above the bifurcation. The large bowel ended blindly just anterior to the prostate gland, and there appeared to be a very small opening into the urethra in this area.